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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/004,999	12/07/2001	George M. Vais	VAIG101	9222

21658 7590 08/05/2003
DYKAS, SHAVER & NIPPER, LLP
P O BOX 877
BOISE, ID 83701-0877

EXAMINER

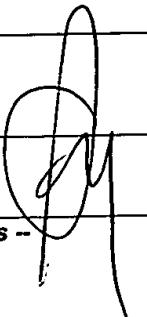
CHAMBERS, TROY

ART UNIT	PAPER NUMBER
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3641

DATE MAILED: 08/05/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)
	10/004,999	VAIS, GEORGE M. 
Period for Reply <p style="text-align: center;"><i>-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --</i></p>	Examiner	Art Unit
	Troy Chambers	3641

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on _____.

2a) This action is **FINAL**. 2b) This action is non-final.

3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1-3, 9, 10, 13 and 16 is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5) Claim(s) _____ is/are allowed.

6) Claim(s) 1-3, 9, 10, 13 and 16 is/are rejected.

7) Claim(s) _____ is/are objected to.

8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.

10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11) The proposed drawing correction filed on _____ is: a) approved b) disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.

12) The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
2. Certified copies of the priority documents have been received in Application No. _____.
3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.

14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) The translation of the foreign language provisional application has been received.

15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) <input type="checkbox"/> Notice of References Cited (PTO-892) 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____.	4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____. 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) 6) <input type="checkbox"/> Other: _____.
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DETAILED ACTION

1. Claims 1, 2, 9, 10 and 13 are objected to because of the following informalities:
These claims contain open-ended brackets that should be removed. Appropriate correction is required.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3. Claims 2, 3, 9, 10, 13 and 16 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter that was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Specifically, claims 2 and 13 recite, "at least four elongated openings." Figures 2 and 3 reveal only 3 elongated openings. Paragraph 25 of the specification reveals nothing about the number of elongated opening. Moreover, the language "at least four" suggests that more than four elongated openings can be present. The original specification does not support this subject matter. Only 3 longitudinal openings are disclosed in original Figures 2 and 3.

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 1, 2, 3 and 13 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 4967642 issued to Mihaita. Mihaita discloses a muzzle brake comprising a cylindrical body 200 having a central bore, at least one opening 210 having a longitudinal dimension greater than a lateral dimension (the holes are cut at a 45° angle and thus create an elongated hole), and, a plurality of gas holes 212 linearly disposed along a longitudinal axis of the body.

6. Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent Design D285238 issued to Cellini. Cellini discloses a muzzle brake comprising a cylindrical body having a central bore, at least one opening having a longitudinal dimension greater than a lateral dimension, and, a plurality of gas holes linearly disposed along a longitudinal axis of the body.

7. Claim 1 is rejected under 35 U.S.C. 102(b) as being clearly anticipated by U.S. 4691614 issued to Leffel.

8. Claims 1, 2, 3 and 13 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by U.S. 4574682 issued to Hillman.

9. Claims 1 and 2 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by U.S. 5305677 issued to Kleinguenther.

Claim Rejections - 35 USC § 103

10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

11. Claims 9, 10 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Mihaita in view of U.S. Patent No. 5305677 issued to Kleinguenthaler. Mihaita discloses a muzzle brake as described above. But, neither Mihaita discloses the at least one opening as claimed by the applicant. However, Kleinguenthaler discloses such an opening. Specifically, Kleinguenthaler discloses a muzzle brake comprising a cylindrical body of predetermined length having a plurality of exhaust ports 9 formed by the intersection of multiple radial holes (col. 3, ll. 31-33 to col. 4, ll. 1-4). At the time of the invention, one of ordinary skill in the art would have found it obvious to form a longitudinal slot with the intersection of multiple radial holes as disclosed by Kleinguenthaler. The suggestion/motivation for doing so would have been to form a slot by drilling as opposed to milling.

12. Claims 3, 9, 10, 13 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. 5305677 issued to Kleinguenthaler. Kleinguenthaler discloses a muzzle brake for a firearm comprising a cylindrical body and exhaust slots formed by the intersection of multiple radial holes. The exhaust slots of Kleinguenthaler are not linearly disposed along the axis of the cylindrical body as claimed by the applicant.

However, one of ordinary skill in the art would have found it obvious to provide the cylindrical body of Kleinguenther with linearly disposed slots. The objective of the slots is to reduce the recoil of a firearm by exhausting gasses in a manner that allows a portion of the gasses to counterbalance the recoil effect of the firearm. The disposition of the slots is of no consequence because the net release of gas would be the same.

Response to Arguments

13. With respect to Mihaita, the examiner has changed the rejection to designate openings 210 as the longitudinally elongated openings for the reasons set forth in the rejection. With respect to Cellini, claim 1 requires the longitudinally elongated opening to be positioned nearest the first end as compared to *any other* aperture. The examiner is comparing the elongated openings in the central part of the muzzle brake to the openings at the left end of the brake. Comparing the two, the elongated openings are closer to the first end than the opening on the left end.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

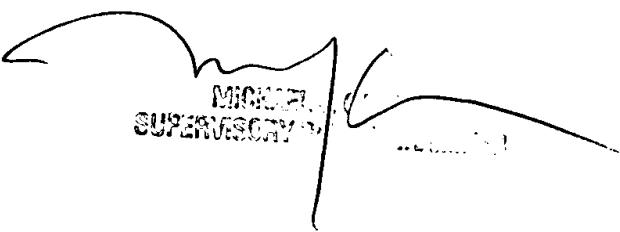
A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the

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shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

1. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Troy Chambers whose telephone number is (703) 308-5870. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael J. Carone, can be reached at (703) 306-4198.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 306-4177. The fax phone number for the organization where this application or proceeding is assigned is (703) 305-7687.



MICHAEL
SUPERVISORY